

## 5.13 Environmental Justice

Executive Order 12898, *Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations* (59 FR 7629), directs Federal agencies in the Executive Branch to consider environmental justice so that their programs will not have "...disproportionately high and adverse human health or environmental effects..." on minority and low-income populations. Executive Order 12898 further directed Federal agencies to consider effects to "populations with differential patterns of subsistence consumption of fish and wildlife." The Executive Branch agencies also were directed to develop plans for carrying out the order. The CEQ provided additional guidance later for integrating environmental justice into the National Environmental Policy Act process in a December 1997 document, *Environmental Justice Guidance Under the National Environmental Policy Act* (CEQ 1997b).

Environmental justice is concerned with assessing the disproportionate distribution of adverse impacts of an action among minority and low-income populations, in which the impacts are significantly greater than those experienced by the rest of the population. Adverse impacts are defined as negative changes to the existing conditions in the natural environment (for example, land, air, water, wildlife, vegetation) or in the human environment (for example, employment, health, land use). The distribution of minority and low-income groups in the Hanford environs is shown graphically in Section 4.8.

Based on the 2000 Census, the 80-km (50-mi) radius area surrounding the Hanford Site has a total population of 482,300 and a minority population of 178,500 (Census 2000). The ethnic composition of the minority population is primarily White Hispanic (24 percent), self-designated "other and multiple" races (63 percent), Native American (6 percent), and two or more races (9 percent). Asians and Pacific Islanders (4 percent) and African American (3 percent) make up the rest. The Hispanic population resides predominantly in Franklin, Yakima, Grant, and Adams counties. Native Americans within the 80-km (50-mi) area reside primarily on the Yakama Reservation and upstream of the Hanford Site near the town of Beverly, Washington.

The 2000 low-income population was approximately 80,700, or 17 percent of the total population residing in the 80-km (50-mi) radius of the Hanford Site. The majority of these households were located to the southwest and northwest of the site (Yakima and Grant counties) and in the cities of Pasco and Kennewick.

Native Americans of various tribal affiliations who live in the greater Columbia Basin rely in part on natural resources for subsistence. According to Harris and Harper (1997), the Nez Perce Tribe, the Confederated Tribes of the Umatilla Indian Reservation, and the Yakama Nation depend on natural resources for dietary subsistence. For example, the treaty of 1855 with the Yakama Nation (Treaty with the Yakama 1855) secured to the Yakamas "...the right of taking fish at all usual and accustomed places, in common with the citizens of the Territory [now the state of Washington] and of erecting temporary buildings for curing them; together with the privilege of hunting, gathering roots and berries, and pasturing their horses and cattle upon open and unclaimed lands." The Wanapum historically lived along the Columbia River and continue to live upstream of the Hanford Site. They fish on the Columbia River and

gather food resources near the Hanford Site. The Confederated Tribes of the Colville Reservation traditionally fished and gathered food resources in the Hanford area. They also are recognized as having cultural and religious ties to the Hanford Site.

The pathways through which the potential environmental impacts are associated, with respect to each of the alternative groups, and how they might disproportionately impact minority or low-income groups were reviewed for each of the associated sections of Section 5. The only aspect that exhibited the potential for disproportionate impacts dealt with implications of cultural resources on the Hanford Site with respect to Native Americans. Furthermore, these would be common to all of the alternative groups. Native American affiliations near the Hanford Site include such places as Gable Mountain, Rattlesnake Mountain, and Gable Butte with respect to their creation beliefs and cultural heritage. Thus disproportionate adverse impacts from implementing any of the alternative groups on minority or low-income populations would be limited to those that might be associated with restricted use of Native American traditional cultural places on the Hanford Site. Additional information on cultural resources were presented in Section 5.7. Other impacts related to aesthetic and scenic resources were addressed in Section 5.12.